

IN THE CLAIMS

1 1. (previously presented) A method for updating a program in a data processing
2 system comprising the steps of:

3 requesting a trusted platform module ("TPM") to perform a signature
4 verification of an update to the program;

5 the TPM performing the signature verification of the update to the program;

6 if the signature verification of the update to the program is successful, using
7 the TPM for unlocking a memory unit storing the program; and

8 modifying the program with the update to the program in response to the
9 unlocking of the memory unit storing the program.

1 2. (original) The method as recited in claim 1, further comprising the step of:
2 locking the memory unit after the modifying step.

1 3. (original) The method as recited in claim 2, wherein the locking step is
2 performed by the TPM.

1 4. (previously presented) A computer program product for storage on a
2 computer readable medium and operable for updating a BIOS stored in a flash
3 memory in a data processing system, comprising:

4 a BIOS update application program receiving an updated BIOS image;

5 the BIOS update application requesting a TPM to perform a signature
6 verification of the updated BIOS image;

7 a TPM program receiving the request from the BIOS update application to
8 perform the signature verification of the updated BIOS image;

9 the TPM program performing the signature verification of the updated BIOS
10 image and posting a result of the signature verification of the updated BIOS image to
11 the BIOS update application;

1 if the result of the signature verification of the updated BIOS image
2 determines that the updated BIOS image is authentic, then the TPM program unlocks
3 the flash memory; and

4 the BIOS update application modifies the BIOS with the updated BIOS image.

5. (cancelled)

1 6. (previously presented) The computer program product as recited in claim 4,
2 further comprising:

3 programming for locking the flash memory after the BIOS update application
4 modifies the BIOS with the updated BIOS image.

1 7. (original) The computer program product as recited in claim 6, further
2 comprising:

3 if the result of the signature verification of the updated BIOS image
4 determines that the updated BIOS image is not authentic, then an error message is
5 output.

1 8. (original) A data processing system having circuitry for updating a BIOS
2 stored in a flash memory in the data processing system, comprising:

3 input circuitry for receiving an updated BIOS image;

4 circuitry for requesting a TPM to perform a signature verification of the
5 updated BIOS image;

6 the TPM performing the signature verification of the updated BIOS image;

7 the TPM unlocking the flash memory if the signature verification of the
8 updated BIOS image determines that the updated BIOS image is authentic; and

9 circuitry for modifying the BIOS with the updated BIOS image.

1 9. (original) The system as recited in claim 8, further comprising:
2 circuitry for locking the flash memory after the BIOS is modified with the
3 updated BIOS image.

1 10. (original) The system as recited in claim 8, further comprising:
2 circuitry for outputting an error if the signature verification of the updated
3 BIOS image determines that the updated BIOS image is not authentic.